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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/786,214	02/25/2004	Dan J. Bills	7678.782	3045
7590 10/07/2005			EXAMINER	
Rick D. Nydegger WORKMAN NYDEGGER 1000 Eagle Gate Tower 60 East South Temple Salt Lake City, UT 84111			MACPHERSON, MEOGHAN E	
			ART UNIT	PAPER NUMBER
			3732	

DATE MAILED: 10/07/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

## Office Action Summary

Application No.

10/786,214

Applicant(s)

BILLS ET AL.

Examiner

Meaghan E. MacPherson

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☐ Responsive to communication(s) filed on \_\_\_\_.
- 2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-20 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-20 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 2/25/2004 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- ☒ Notice of References Cited (PTO-892)
- ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date 6/7/2004.
- ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_.
- ☐ Notice of Informal Patent Application (PTO-152)
- ☐ Other: \_\_\_\_.

## DETAILED ACTION

### *Drawings*

1. The drawings submitted on February 25, 2004 have been accepted by the examiner.

### *Claim Rejections - 35 USC § 102*

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

3. Claims 2, 3, 5, 6, 8-10, 18, and 20 are rejected under 35 U.S.C. 102(b) as being anticipated by Sauveur'155 (US Patent No. 4,820,155).

Sauveur'155 discloses a rubber dam frame 1 comprising a thin, bendable support member 2,3 having an inner edge and an outer edge, a substantially circular configuration, and being sized and configured so as to hold and maintain a rubber dam in a particular orientation relative to a patient's mouth (col. 1, lines 53-64; see Figures 1,5 and 6). The support member is sufficiently bendable to allow a dental practitioner to bend a desired portion of the support member away from the patient's mouth during use to allow unimpeded access to an area of the mouth. The rubber dam frame is comprised of six substantially evenly spaced barbs 4 on the outer edge of the bendable support member for retaining a rubber dam, this dam comprising a rubber sheet formed on said support member (col. 2, lines 57-60; see Figure1). Sauveur'155 also discloses that the barbs extend outwardly and lie substantially in a plane defined by the support member prior to use, and that the barbs also lie laterally relative to the support member.

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Sauveur'155 further discloses a rubber dam kit comprising a rubber dam frame and rubber dam material (col. 4, lines 12-15).

***Claim Rejections - 35 USC § 103***

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

5. Claims 1 and 16 are rejected under 35 U.S.C. 103(a) as being unpatentable over Sauveur'155. Sauveur'155 discloses a rubber dam frame that shows the limitations as described above; however, Sauveur'155 does not disclose the support member being made of a metal. It would have been obvious to one having ordinary skill in the art at the time the invention was made to make the support member out of metal, since it has been held to be within the general skill of a worker in the art to select a known material on the basis of its suitability for the intended use as a matter of obvious design choice. *In re Leshin*, 125 USPQ 416.

6. Claim 4 is rejected under 35 U.S.C. 103(a) as being unpatentable over Sauveur'155. Sauveur'155 discloses the claimed invention except for the barbs being formed within recesses between the inner and outer edges of the support member. It would have been obvious to one having ordinary skill in the art at the time the invention was made to place the barbs within recesses between the inner and outer edges of the support member, since it has been held that rearranging parts of an invention involves only routine skill in the art. *In re Japikse*, 86 USPQ 70.

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7. Claim 7 is rejected under 35 U.S.C. 103(a) as being unpatentable over Sauveur'155.

Sauveur'155 discloses a rubber dam frame that shows the limitations as described above; however, Sauveur'155 does not disclose the rubber dam frame including at least 10 barbs substantially evenly spaced around the support member. It would have been obvious to one having ordinary skill in the art at the time the invention was made to, include at least 10 barbs substantially evenly spaced around the support member of the dam frame, since it has been held that mere duplication of the essential working parts of a device involves only routine skill in the art. *St. Regis Paper Co. v. Bemis Co.*, 193 USPQ 8.

8. Claims 13-15 are rejected under 35 U.S.C. 103(a) as being unpatentable over Sauveur'155. Sauveur'155 discloses a rubber dam frame that shows the limitations as described above; however, Sauveur'155 does not disclose the support member having a thickness in a range of about 0.005 inch to about 0.25 inch, the support member having a thickness in a range of about 0.015 inch to about 0.062 inch, or the support member having a thickness in a range of about 0.02 inch to about 0.04 inch. It would have been obvious to one having ordinary skill in the art at the time the invention was made to make the support member with a thickness in a range of about 0.005 inch to about 0.25 inch, a thickness in a range of about 0.015 inch to about 0.062 inch, or a thickness in a range of about 0.02 inch to about 0.04 inch, since it has been held that where the general conditions of a claim are disclosed in the prior art, discovering the optimum or workable ranges involves only routine skill in the art. *In re Aller*, 105 USPQ 233.

9. Claims 11, 12, 17, and 19 are rejected under 35 U.S.C. 103(a) as being unpatentable over Sauveur'155 in view of Stoughton'133 (US Patent No. 1,292,133).

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Sauveur'155 discloses a rubber dam frame that shows the limitations as described above; however, Sauveur'155 does not disclose the support member comprising aluminum or anodized aluminum. Stoughton'133 teaches a dam frame with a support member 10 formed of aluminum or other suitable member (page 1, lines 44-49; see Figure 1). It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the dam frame of Sauveur'155 to incorporate the teachings of Stoughton'133 to create a dam frame with a support member sufficiently bendable so as to maintain its configuration when bent to fit the contours of the patient's mouth and bent back to provide access to desired areas of the mouth for additional dental procedures with the dental dam still in place.

### *Conclusion*

10. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

US Patent No. 4,664,628 to Totaro discloses a dental screening tool with an integral flexible metal frame.

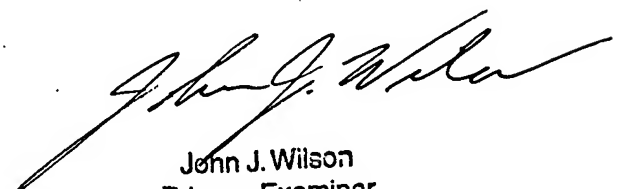
11. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Meaghan E. MacPherson whose telephone number is (571)-272-5565. The examiner can normally be reached on Mon-Fri 9am-5pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Kevin Shaver can be reached on (571)-272-4720. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

  
Meaghan E. MacPherson

  
John J. Wilson  
Primary Examiner